D R Englund

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13,986 115 201 57 h-index g-index citations papers 6.85 18,736 287 11.2 L-index ext. citations avg, IF ext. papers

#	Paper	IF	Citations
201	Deep learning with coherent nanophotonic circuits. <i>Nature Photonics</i> , 2017 , 11, 441-446	33.9	860
200	Solid-state single-photon emitters. <i>Nature Photonics</i> , 2016 , 10, 631-641	33.9	804
199	Chip-integrated ultrafast graphene photodetector with high responsivity. <i>Nature Photonics</i> , 2013 , 7, 883-887	33.9	768
198	Controlling the spontaneous emission rate of single quantum dots in a two-dimensional photonic crystal. <i>Physical Review Letters</i> , 2005 , 95, 013904	7.4	684
197	Controlling cavity reflectivity with a single quantum dot. <i>Nature</i> , 2007 , 450, 857-61	50.4	459
196	Coherent generation of non-classical light on a chip via photon-induced tunnelling and blockade. <i>Nature Physics</i> , 2008 , 4, 859-863	16.2	403
195	Ultrafast photonic crystal nanocavity laser. <i>Nature Physics</i> , 2006 , 2, 484-488	16.2	402
194	Reliable Exfoliation of Large-Area High-Quality Flakes of Graphene and Other Two-Dimensional Materials. <i>ACS Nano</i> , 2015 , 9, 10612-20	16.7	334
193	Controlled phase shifts with a single quantum dot. <i>Science</i> , 2008 , 320, 769-72	33.3	325
192	Robust Multicolor Single Photon Emission from Point Defects in Hexagonal Boron Nitride. <i>ACS Nano</i> , 2016 , 10, 7331-8	16.7	285
191	Material platforms for spin-based photonic quantum technologies. <i>Nature Reviews Materials</i> , 2018 , 3, 38-51	73.3	272
190	Deterministic coupling of a single nitrogen vacancy center to a photonic crystal cavity. <i>Nano Letters</i> , 2010 , 10, 3922-6	11.5	267
189	Advances in quantum cryptography. Advances in Optics and Photonics, 2020, 12, 1012	16.7	256
188	A MoTe-based light-emitting diode and photodetector for silicon photonic integrated circuits. <i>Nature Nanotechnology</i> , 2017 , 12, 1124-1129	28.7	229
187	Tunable and high-purity room temperature single-photon emission from atomic defects in hexagonal boron nitride. <i>Nature Communications</i> , 2017 , 8, 705	17.4	226
186	Quantum transport simulations in a programmable nanophotonic processor. <i>Nature Photonics</i> , 2017 , 11, 447-452	33.9	211
185	Strong enhancement of light-matter interaction in graphene coupled to a photonic crystal nanocavity. <i>Nano Letters</i> , 2012 , 12, 5626-31	11.5	204

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184	Probing the ultimate plasmon confinement limits with a van der Waals heterostructure. <i>Science</i> , 2018 , 360, 291-295	33.3	179	
183	On-chip detection of non-classical light by scalable integration of single-photon detectors. <i>Nature Communications</i> , 2015 , 6, 5873	17.4	176	
182	Efficient, compact and low loss thermo-optic phase shifter in silicon. <i>Optics Express</i> , 2014 , 22, 10487-93	3.3	174	
181	Controlling the spontaneous emission rate of monolayer MoS in a photonic crystal nanocavity. Applied Physics Letters, 2013 , 103, 181119	3.4	155	
180	High-contrast electrooptic modulation of a photonic crystal nanocavity by electrical gating of graphene. <i>Nano Letters</i> , 2013 , 13, 691-6	11.5	151	
179	Programmable photonic circuits. <i>Nature</i> , 2020 , 586, 207-216	50.4	151	
178	Broadband magnetometry and temperature sensing with a light-trapping diamond waveguide. Nature Physics, 2015 , 11, 393-397	16.2	150	
177	High-Responsivity Graphene-Boron Nitride Photodetector and Autocorrelator in a Silicon Photonic Integrated Circuit. <i>Nano Letters</i> , 2015 , 15, 7288-93	11.5	140	
176	Quantum nanophotonics in diamond [Invited]. <i>Journal of the Optical Society of America B: Optical Physics</i> , 2016 , 33, B65	1.7	136	
175	Experimental demonstration of memory-enhanced quantum communication. <i>Nature</i> , 2020 , 580, 60-64	50.4	132	
174	Ultrafast photon-photon interaction in a strongly coupled quantum dot-cavity system. <i>Physical Review Letters</i> , 2012 , 108, 093604	7.4	131	
173	Chalcogenide glass-on-graphene photonics. <i>Nature Photonics</i> , 2017 , 11, 798-805	33.9	125	
172	Coherent spin control of a nanocavity-enhanced qubit in diamond. <i>Nature Communications</i> , 2015 , 6, 617	73 17.4	119	
171	Inference in artificial intelligence with deep optics and photonics. <i>Nature</i> , 2020 , 588, 39-47	50.4	114	
170	Linear programmable nanophotonic processors. <i>Optica</i> , 2018 , 5, 1623	8.6	113	
169	Efficient photon collection from a nitrogen vacancy center in a circular bullseye grating. <i>Nano</i> Letters, 2015 , 15, 1493-7	11.5	112	
168	High-speed electro-optic modulator integrated with graphene-boron nitride heterostructure and photonic crystal nanocavity. <i>Nano Letters</i> , 2015 , 15, 2001-5	11.5	111	
16 7	Photon-efficient quantum key distribution using timeBnergy entanglement with high-dimensional encoding. New Journal of Physics, 2015 , 17, 022002	2.9	109	

166	High-dimensional quantum key distribution using dispersive optics. <i>Physical Review A</i> , 2013 , 87,	2.6	103
165	Scalable focused ion beam creation of nearly lifetime-limited single quantum emitters in diamond nanostructures. <i>Nature Communications</i> , 2017 , 8, 15376	17.4	102
164	Hybrid Integration of Solid-State Quantum Emitters on a Silicon Photonic Chip. <i>Nano Letters</i> , 2017 , 17, 7394-7400	11.5	95
163	Experimental investigation of performance differences between coherent Ising machines and a quantum annealer. <i>Science Advances</i> , 2019 , 5, eaau0823	14.3	94
162	Self-Similar Nanocavity Design with Ultrasmall Mode Volume for Single-Photon Nonlinearities. <i>Physical Review Letters</i> , 2017 , 118, 223605	7.4	93
161	Integration of single photon emitters in 2D layered materials with a silicon nitride photonic chip. <i>Nature Communications</i> , 2019 , 10, 4435	17.4	92
160	Large-scale integration of artificial atoms in hybrid photonic circuits. <i>Nature</i> , 2020 , 583, 226-231	50.4	90
159	Integrated Source of Spectrally Filtered Correlated Photons for Large-Scale Quantum Photonic Systems. <i>Physical Review X</i> , 2014 , 4,	9.1	85
158	Broadband Coherent Absorption in Chirped-Planar-Dielectric Cavities for 2D-Material-Based Photovoltaics and Photodetectors. <i>ACS Photonics</i> , 2014 , 1, 768-774	6.3	80
157	Hybrid integration methods for on-chip quantum photonics. <i>Optica</i> , 2020 , 7, 291	8.6	77
156	Ultrafast Graphene Light Emitters. <i>Nano Letters</i> , 2018 , 18, 934-940	11.5	75
155	Large-scale quantum photonic circuits in silicon. <i>Nanophotonics</i> , 2016 , 5, 456-468	6.3	75
154	Large-Scale Optical Neural Networks Based on Photoelectric Multiplication. <i>Physical Review X</i> , 2019 , 9,	9.1	72
153	Local tuning of photonic crystal cavities using chalcogenide glasses. <i>Applied Physics Letters</i> , 2008 , 92, 043123	3.4	70
152	Wide-field multispectral super-resolution imaging using spin-dependent fluorescence in nanodiamonds. <i>Nano Letters</i> , 2013 , 13, 2073-7	11.5	68
151	Bright Room-Temperature Single-Photon Emission from Defects in Gallium Nitride. <i>Advanced Materials</i> , 2017 , 29, 1605092	24	66
150			
150	Routing entanglement in the quantum internet. <i>Npj Quantum Information</i> , 2019 , 5,	8.6	66

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148	Enhanced photodetection in graphene-integrated photonic crystal cavity. <i>Applied Physics Letters</i> , 2013 , 103, 241109	3.4	61	
147	Rate-distance tradeoff and resource costs for all-optical quantum repeaters. <i>Physical Review A</i> , 2017 , 95,	2.6	60	
146	Lead-related quantum emitters in diamond. <i>Physical Review B</i> , 2019 , 99,	3.3	57	
145	Quantum optical neural networks. <i>Npj Quantum Information</i> , 2019 , 5,	8.6	57	
144	Scalable Integration of Long-Lived Quantum Memories into a Photonic Circuit. <i>Physical Review X</i> , 2015 , 5,	9.1	57	
143	Transform-Limited Photons From a Coherent Tin-Vacancy Spin in Diamond. <i>Physical Review Letters</i> , 2020 , 124, 023602	7.4	56	
142	Scalable fabrication of high purity diamond nanocrystals with long-spin-coherence nitrogen vacancy centers. <i>Nano Letters</i> , 2014 , 14, 32-6	11.5	56	
141	Bright and photostable single-photon emitter in silicon carbide. <i>Optica</i> , 2016 , 3, 768	8.6	53	
140	Unconditional security of time-energy entanglement quantum key distribution using dual-basis interferometry. <i>Physical Review Letters</i> , 2014 , 112, 120506	7.4	52	
139	Thermal radiation control from hot graphene electrons coupled to a photonic crystal nanocavity. <i>Nature Communications</i> , 2019 , 10, 109	17.4	51	
138	Modulation of nitrogen vacancy charge state and fluorescence in nanodiamonds using electrochemical potential. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016 , 113, 3938-43	11.5	50	
137	High-resolution optical spectroscopy using multimode interference in a compact tapered fibre. <i>Nature Communications</i> , 2015 , 6, 7762	17.4	49	
136	A high-resolution spectrometer based on a compact planar two dimensional photonic crystal cavity array. <i>Applied Physics Letters</i> , 2012 , 100, 231104	3.4	48	
135	Metropolitan Quantum Key Distribution with Silicon Photonics. <i>Physical Review X</i> , 2018 , 8,	9.1	47	
134	Graphene-Based Josephson-Junction Single-Photon Detector. Physical Review Applied, 2017, 8,	4.3	47	
133	High-sensitivity spin-based electrometry with an ensemble of nitrogen-vacancy centers in diamond. <i>Physical Review A</i> , 2017 , 95,	2.6	46	
132	Efficient photon coupling from a diamond nitrogen vacancy center by integration with silica fiber. <i>Light: Science and Applications</i> , 2016 , 5, e16032	16.7	46	
131	Development of Quantum Interconnects (QuICs) for Next-Generation Information Technologies. <i>PRX Quantum</i> , 2021 , 2,	6.1	46	

130	High-fidelity quantum state evolution in imperfect photonic integrated circuits. <i>Physical Review A</i> , 2015 , 92,	2.6	45
129	Robust high-dynamic-range vector magnetometry with nitrogen-vacancy centers in diamond. <i>Applied Physics Letters</i> , 2018 , 112, 252406	3.4	44
128	A CMOS-integrated quantum sensor based on nitrogenMacancy centres. <i>Nature Electronics</i> , 2019 , 2, 284-289	28.4	44
127	Surface Structure of Aerobically Oxidized Diamond Nanocrystals. <i>Journal of Physical Chemistry C</i> , 2014 , 118, 26695-26702	3.8	44
126	Nanofabrication on unconventional substrates using transferred hard masks. <i>Scientific Reports</i> , 2015 , 5, 7802	4.9	43
125	A scalable multi-photon coincidence detector based on superconducting nanowires. <i>Nature Nanotechnology</i> , 2018 , 13, 596-601	28.7	43
124	Timekeeping with electron spin states in diamond. <i>Physical Review A</i> , 2013 , 87,	2.6	43
123	Efficient generation of single and entangled photons on a silicon photonic integrated chip. <i>Physical Review A</i> , 2011 , 84,	2.6	43
122	Optical coherence of diamond nitrogen-vacancy centers formed by ion implantation and annealing. <i>Physical Review B</i> , 2019 , 99,	3.3	42
121	Fast thermal relaxation in cavity-coupled graphene bolometers with a Johnson noise read-out. <i>Nature Nanotechnology</i> , 2018 , 13, 797-801	28.7	42
120	Efficient Extraction of Light from a Nitrogen-Vacancy Center in a Diamond Parabolic Reflector. <i>Nano Letters</i> , 2018 , 18, 2787-2793	11.5	41
119	Rectangular photonic crystal nanobeam cavities in bulk diamond. <i>Applied Physics Letters</i> , 2017 , 111, 021	<u>1</u> 903	39
118	Entanglement-based quantum communication secured by nonlocal dispersion cancellation. <i>Physical Review A</i> , 2014 , 90,	2.6	39
117	Two-dimensional photonic crystal slab nanocavities on bulk single-crystal diamond. <i>Applied Physics Letters</i> , 2018 , 112, 141102	3.4	38
116	Nonlinear temporal dynamics of a strongly coupled quantum-dotBavity system. <i>Physical Review A</i> , 2012 , 85,	2.6	38
115	Wide-field strain imaging with preferentially aligned nitrogen-vacancy centers in polycrystalline diamond. <i>New Journal of Physics</i> , 2016 , 18, 123023	2.9	37
114	AlGaN/AlN integrated photonics platform for the ultraviolet and visible spectral range. <i>Optics Express</i> , 2016 , 24, 25415-25423	3.3	37
113	Advances in quantum light emission from 2D materials. <i>Nanophotonics</i> , 2019 , 8, 2017-2032	6.3	36

112	Quantum Computer Systems for Scientific Discovery. PRX Quantum, 2021, 2,	6.1	36
111	Nanoscale Engineering of Closely-Spaced Electronic Spins in Diamond. <i>Nano Letters</i> , 2016 , 16, 4982-90	11.5	34
110	High-performance flexible waveguide-integrated photodetectors. <i>Optica</i> , 2018 , 5, 44	8.6	34
109	Generation of ensembles of individually resolvable nitrogen vacancies using nanometer-scale apertures in ultrahigh-aspect ratio planar implantation masks. <i>Nano Letters</i> , 2015 , 15, 1751-8	11.5	33
108	High sensitivity gas sensor based on high-Q suspended polymer photonic crystal nanocavity. <i>Applied Physics Letters</i> , 2014 , 104, 241108	3.4	32
107	Graphene-based Josephson junction microwave bolometer. <i>Nature</i> , 2020 , 586, 42-46	50.4	32
106	Heuristic recurrent algorithms for photonic Ising machines. <i>Nature Communications</i> , 2020 , 11, 249	17.4	31
105	Fabrication of triangular nanobeam waveguide networks in bulk diamond using single-crystal silicon hard masks. <i>Applied Physics Letters</i> , 2014 , 105, 211101	3.4	31
104	Accelerating recurrent Ising machines in photonic integrated circuits. <i>Optica</i> , 2020 , 7, 551	8.6	31
103	Variational quantum unsampling on a quantum photonic processor. <i>Nature Physics</i> , 2020 , 16, 322-327	16.2	29
102	Active 2D materials for on-chip nanophotonics and quantum optics. <i>Nanophotonics</i> , 2017 , 6, 1329-1342	6.3	28
101	Practical high-dimensional quantum key distribution with decoy states. <i>Physical Review A</i> , 2015 , 91,	2.6	28
100	Long-lived NVBpin coherence in high-purity diamond membranes. New Journal of Physics, 2012, 14, 0930	0 <u>0</u> .4	28
99	Integrated on Chip Platform with Quantum Emitters in Layered Materials. <i>Advanced Optical Materials</i> , 2019 , 7, 1901132	8.1	27
98	Bright nanowire single photon source based on SiV centers in diamond. <i>Optics Express</i> , 2018 , 26, 80-89	3.3	27
97	Dynamic Exciton Funneling by Local Strain Control in a Monolayer Semiconductor. <i>Nano Letters</i> , 2020 , 20, 6791-6797	11.5	27
96	Experimental quantum speed-up in reinforcement learning agents. <i>Nature</i> , 2021 , 591, 229-233	50.4	23
95	Invited Article: Precision nanoimplantation of nitrogen vacancy centers into diamond photonic crystal cavities and waveguides. <i>APL Photonics</i> , 2016 , 1, 020801	5.2	23

94	Photophysics of GaN single-photon emitters in the visible spectral range. <i>Physical Review B</i> , 2018 , 97,	3.3	22
93	Nanophotonic filters and integrated networks in flexible 2D polymer photonic crystals. <i>Scientific Reports</i> , 2013 , 3, 2145	4.9	20
92	The potential and global outlook of integrated photonics for quantum technologies. <i>Nature Reviews Physics</i> , 2022 , 4, 194-208	23.6	20
91	Plasmonic antenna coupling to hyperbolic phonon-polaritons for sensitive and fast mid-infrared photodetection with graphene. <i>Nature Communications</i> , 2020 , 11, 4872	17.4	19
90	Cascaded Cavities Boost the Indistinguishability of Imperfect Quantum Emitters. <i>Physical Review Letters</i> , 2019 , 122, 183602	7.4	18
89	Wide-Field Magnetic Field and Temperature Imaging Using Nanoscale Quantum Sensors. <i>ACS Applied Materials & Discourse (Materials & Discourse)</i> 12, 26525-26533	9.5	18
88	Controlled-Phase Gate Using Dynamically Coupled Cavities and Optical Nonlinearities. <i>Physical Review Letters</i> , 2020 , 124, 160501	7.4	18
87	Metal-dielectric antennas for efficient photon collection from diamond color centers. <i>Optics Express</i> , 2018 , 26, 3341-3352	3.3	18
86	Scalable fabrication of coupled NV center - photonic crystal cavity systems by self-aligned N ion implantation. <i>Optical Materials Express</i> , 2017 , 7, 1514	2.6	18
85	One-dimensional photonic crystal cavities in single-crystal diamond. <i>Photonics and Nanostructures - Fundamentals and Applications</i> , 2015 , 15, 130-136	2.6	17
84	Josephson junction infrared single-photon detector. <i>Science</i> , 2021 , 372, 409-412	33.3	17
83	Distributed Quantum Fiber Magnetometry. Laser and Photonics Reviews, 2019, 13, 1900075	8.3	16
82	Quantum logic using correlated one-dimensional quantum walks. Npj Quantum Information, 2018, 4,	8.6	16
81	Controlled LightMatter Interaction in Graphene Electrooptic Devices Using Nanophotonic Cavities and Waveguides. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2014 , 20, 95-105	3.8	16
80	Broadband loop gap resonator for nitrogen vacancy centers in diamond. <i>Review of Scientific Instruments</i> , 2018 , 89, 094705	1.7	16
79	Large-scale uniform optical focus array generation with a phase spatial light modulator. <i>Optics Letters</i> , 2019 , 44, 3178-3181	3	15
78	Bright High-Purity Quantum Emitters in Aluminum Nitride Integrated Photonics. <i>ACS Photonics</i> , 2020 , 7, 2650-2657	6.3	15
77	Diamond-nitrogen-vacancy electronic and nuclear spin-state anticrossings under weak transverse magnetic fields. <i>Physical Review A</i> , 2016 , 94,	2.6	15

76	Percolation thresholds for photonic quantum computing. <i>Nature Communications</i> , 2019 , 10, 1070	17.4	14
75	Strain-Correlated Localized Exciton Energy in Atomically Thin Semiconductors. <i>ACS Photonics</i> , 2020 , 7, 1135-1140	6.3	14
74	Programmable dispersion on a photonic integrated circuit for classical and quantum applications. <i>Optics Express</i> , 2017 , 25, 21275-21285	3.3	14
73	Chirped circular dielectric gratings for near-unity collection efficiency from quantum emitters in bulk diamond. <i>Optics Express</i> , 2017 , 25, 32420	3.3	14
72	Design of high-speed phase-only spatial light modulators with two-dimensional tunable microcavity arrays. <i>Optics Express</i> , 2019 , 27, 30669-30680	3.3	14
71	Low-Temperature Electron P honon Interaction of Quantum Emitters in Hexagonal Boron Nitride. <i>ACS Photonics</i> , 2020 , 7, 1410-1417	6.3	13
70	Planar fabrication of arrays of ion-exfoliated single-crystal-diamond membranes with nitrogen-vacancy color centers. <i>Optical Materials</i> , 2013 , 35, 361-365	3.3	13
69	High-speed programmable photonic circuits in a cryogenically compatible, visibleflear-infrared 200 mm CMOS architecture. <i>Nature Photonics</i> , 2022 , 16, 59-65	33.9	13
68	Quantum networks based on color centers in diamond. Journal of Applied Physics, 2021, 130, 070901	2.5	13
67	Hardware error correction for programmable photonics. <i>Optica</i> , 2021 , 8, 1247	8.6	13
66	Group-III quantum defects in diamond are stable spin-1 color centers. <i>Physical Review B</i> , 2020 , 102,	3.3	12
65	Effect of Spectral Diffusion on the Coherence Properties of a Single Quantum Emitter in Hexagonal Boron Nitride. <i>Journal of Physical Chemistry Letters</i> , 2020 , 11, 1330-1335	6.4	12
64	Photon-photon interactions in dynamically coupled cavities. <i>Physical Review A</i> , 2020 , 101,	2.6	12
63	Polymer Photonic Crystal Nanocavity for Precision Strain Sensing. ACS Photonics, 2017, 4, 1591-1594	6.3	12
62	Reactive ion etching: Optimized diamond membrane fabrication for transmission electron microscopy. <i>Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics</i> , 2013 , 31, 06FF01	1.3	12
61	Percolation-based architecture for cluster state creation using photon-mediated entanglement between atomic memories. <i>Npj Quantum Information</i> , 2019 , 5,	8.6	12
60	Finite-key analysis of high-dimensional time\(\text{B}\)nergy entanglement-based quantum key distribution. Quantum Information Processing, 2015, 14, 1005-1015	1.6	11
59	Low-control and robust quantum refrigerator and applications with electronic spins in diamond. <i>Physical Review A</i> , 2018 , 97,	2.6	11

58	High-dimensional unitary transformations and boson sampling on temporal modes using dispersive optics. <i>Physical Review A</i> , 2016 , 93,	2.6	11
57	On the Possibility of Miniature Diamond-Based Magnetometers Using Waveguide Geometries. <i>Micromachines</i> , 2018 , 9,	3.3	11
56	Strong spinBrbit quenching via the product JahnIIIeller effect in neutral group IV qubits in diamond. <i>Npj Quantum Materials</i> , 2020 , 5,	5	11
55	Freely scalable and reconfigurable optical hardware for deep learning. Scientific Reports, 2021, 11, 3144	4.9	11
54	A tunable waveguide-coupled cavity design for scalable interfaces to solid-state quantum emitters. <i>APL Photonics</i> , 2017 , 2, 046103	5.2	10
53	Temporally and spectrally multiplexed single photon source using quantum feedback control for scalable photonic quantum technologies. <i>New Journal of Physics</i> , 2018 , 20, 063046	2.9	10
52	Deep learning with coherent nanophotonic circuits 2017,		10
51	Limitations of two-level emitters as nonlinearities in two-photon controlled-phase gates. <i>Physical Review A</i> , 2017 , 95,	2.6	10
50	Scalable feedback control of single photon sources for photonic quantum technologies. <i>Optica</i> , 2019 , 6, 335	8.6	10
49	Intrinsic donor-bound excitons in ultraclean monolayer semiconductors. <i>Nature Communications</i> , 2021 , 12, 871	17.4	10
48	Individual control and readout of qubits in a sub-diffraction volume. <i>Npj Quantum Information</i> , 2019 , 5,	8.6	9
47	Quantum Materials with Atomic Precision: Artificial Atoms in Solids: Ab Initio Design, Control, and Integration of Single Photon Emitters in Artificial Quantum Materials. <i>Advanced Functional Materials</i> , 2019 , 29, 1904557	15.6	9
46	Giant enhancement of third-harmonic generation in graphene-metal heterostructures. <i>Nature Nanotechnology</i> , 2021 , 16, 318-324	28.7	9
45	Superconducting Nanowire Single-Photon Detector on Aluminum Nitride 2016 ,		8
44	Cavity-enhanced microwave readout of a solid-state spin sensor. <i>Nature Communications</i> , 2021 , 12, 135	717.4	8
43	. IEEE Journal of Solid-State Circuits, 2021 , 56, 1001-1014	5.5	8
42	Top-down fabrication of high-uniformity nanodiamonds by self-assembled block copolymer masks. <i>Scientific Reports</i> , 2019 , 9, 6914	4.9	7
41	Quantum photonics model for nonclassical light generation using integrated nanoplasmonic cavity-emitter systems. <i>Physical Review A</i> , 2018 , 97,	2.6	7

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40	Integrated nanoplasmonic quantum interfaces for room-temperature single-photon sources. <i>Physical Review B</i> , 2017 , 96,	3.3	7
39	Fiber-Coupled Diamond Micro-Waveguides toward an Efficient Quantum Interface for Spin Defect Centers. <i>ACS Omega</i> , 2017 , 2, 7194-7202	3.9	6
38	Quantum reference beacon-guided superresolution optical focusing in complex media. <i>Science</i> , 2019 , 363, 528-531	33.3	6
37	Large-alphabet encoding for higher-rate quantum key distribution. <i>Optics Express</i> , 2019 , 27, 17539-175	49 .3	6
36	Cryogenic operation of silicon photonic modulators based on the DC Kerr effect. <i>Optica</i> , 2020 , 7, 1385	8.6	6
35	Room-temperature photonic logical qubits via second-order nonlinearities. <i>Nature Communications</i> , 2021 , 12, 191	17.4	6
34	Fundamental Thermal Noise Limits for Optical Microcavities. <i>Physical Review X</i> , 2020 , 10,	9.1	5
33	A phononic interface between a superconducting quantum processor and quantum networked spin memories. <i>Npj Quantum Information</i> , 2021 , 7,	8.6	5
32	Strain tuning of the emission axis of quantum emitters in an atomically thin semiconductor. <i>Optica</i> , 2020 , 7, 580	8.6	4
31	Numerical finite-key analysis of quantum key distribution. Npj Quantum Information, 2020, 6,	8.6	4
30	2019,		3
29	Trace-free counterfactual communication with a nanophotonic processor. <i>Npj Quantum Information</i> , 2019 , 5,	8.6	3
28	High-purity single photon emitter in aluminum nitride photonic integrated circuit 2017,		3
27	Percolation Based Cluster State Generation by Photon-Mediated Entanglement 2018,		3
26	Field-based design of a resonant dielectric antenna for coherent spin-photon interfaces. <i>Optics Express</i> , 2021 , 29, 16469-16476	3.3	3
25	Optically Heralded Entanglement of Superconducting Systems in Quantum Networks. <i>Physical Review Letters</i> , 2021 , 127, 040503	7.4	3
24	Towards Large-Scale Photonic Neural-Network Accelerators 2019,		3
23	Room-Temperature Quantum Sensing in CMOS: On-Chip Detection of Electronic Spin States in Diamond Color Centers for Magnetometry 2018 ,		3

22	Compact mid-infrared graphene thermopile enabled by a nanopatterning technique of electrolyte gates. <i>New Journal of Physics</i> , 2018 , 20, 083050	2.9	3
21	Carrier dynamics and spin-valley-layer effects in bilayer transition metal dichalcogenides. <i>Faraday Discussions</i> , 2019 , 214, 175-188	3.6	2
20	Heterogeneous Integration of 2D Materials and Devices on a Si Platform 2019 , 43-84		2
19	Quantum Random Walks in a Programmable Nanophotonic Processor 2015 ,		2
18	Lead-Related Quantum Emitters in Diamond 2018,		2
17	Investigation of the Stark Effect on a Centrosymmetric Quantum Emitter in Diamond. <i>Physical Review Letters</i> , 2021 , 127, 147402	7.4	2
16	2D materials-enabled optical modulators: From visible to terahertz spectral range. <i>Applied Physics Reviews</i> , 2022 , 9, 021302	17.3	2
15	Quantum emission from atomic defects in wide-bandgap semiconductors 2017 ,		1
14	Single photon detection by cavity-assisted all-optical gain. <i>Physical Review B</i> , 2019 , 99,	3.3	1
13	Clifford-group-restricted eavesdroppers in quantum key distribution. <i>Physical Review A</i> , 2020 , 101,	2.6	1
12	On-chip graphene optoelectronic devices for high-speed modulation and photodetection 2014,		1
11	A vertically-loaded diamond microdisk resonator spin-photon interface. <i>Optics Express</i> ,	3.3	1
10	Variational Quantum Unsampling on a Programmable Nanophotonic Processor 2019,		1
9	Universal linear optics by programmable multimode interference. <i>Optics Express</i> , 2021 , 29, 38257-38267	7 3.3	1
8	Programmable Nanophotonics for Quantum Simulation and Machine Learning 2017,		1
7	Optical Network Switch for Dynamically Reconfigurable Single- and Multi-cast Topologies 2017 ,		1
6	Ultrasensitive Calorimetric Measurements of the Electronic Heat Capacity of Graphene. <i>Nano Letters</i> , 2021 , 21, 5330-5337	11.5	1
5	Ultra-bright emission from hexagonal boron nitride defects as a new platform for bio-imaging and bio-labelling 2016 ,		1

LIST OF PUBLICATIONS

4	A polarization encoded photon-to-spin interface. <i>Npj Quantum Information</i> , 2021 , 7,	8.6	1
3	Wide-Bandgap Integrated Photonic Circuits for Nonlinear Interactions and Interfacing with Quantum Memories 2018 ,		1
2	Piezo-optomechanical cantilever modulators for VLSI visible photonics. <i>APL Photonics</i> , 2022 , 7, 051304	5.2	1
1	Imaging metasurfaces based on graphene-loaded slot antennas. <i>Optics Express</i> , 2021 , 29, 1076-1089	3.3	О